IN THE CLAIMS

Please amend the claims as follows:

Claim 1 (Currently Amended): A cyclic ~~Cyclic~~ method for separating at least one chemical element E1 from at least one chemical element E2 present in an ~~same~~ aqueous solution, each cycle of said method comprising successively ~~the following steps~~:

contacting said aqueous solution with an organic phase containing a first extractant in an organic diluent, wherein the first extractant coextracts E1 and E2 from the aqueous solution, and then separating the organic phase containing E1 and E2 from the aqueous solution;

adding a second extractant to the organic phase containing E1 and E2, wherein the second extractant is one that will selectively retain E2 in the organic phase during the following stripping step;

contacting the organic phase containing E1 and E2 with a first aqueous phase, wherein the first aqueous phase strips E1 from the organic phase, and then separating said first aqueous phase containing E1 from the organic phase;

contacting the organic phase from which E1 has been stripped with a second aqueous phase, wherein said second aqueous phase strips E2 from the organic phase, and then separating said second aqueous phase containing E2 from the organic phase;

separating the first and second extractants from each other so that said extractants can be used again in a subsequent cycle

~~a) co-extracting from said aqueous solution the elements E1 and E2 by bring said solution into contact with a liquid organic phase containing a first extractant in an organic diluent, said first extractant being suited to causing the migration of said elements into said organic phase;~~

~~b) adding to the organic phase a second extractant suited to selectively retaining the element(s) E2 in said organic phase during step c);~~

~~c) selectively stripping the element(s) E1 from the organic phase, by bringing said organic phase into contact with an aqueous solution suited to causing the migration of said element(s) from said organic phase towards said solution;~~

~~d) selectively stripping the element(s) E2 from the organic phase, by bringing said organic phase into contact with an aqueous solution suited to causing the migration of said element(s) from said organic phase towards said solution;~~

~~e) separating the first and second extractants present in said organic phase at the end of step d) from each other with a view to using them again in the following cycle~~.

Claim 2 (Currently Amended): ~~Method~~ The method according to claim 1, in which the first and second extractants are separated from each other by aqueous solubilisation of one of said extractants.

Claim 3 (Currently Amended): ~~Method~~ The method according to claim 1, in which the first and second extractants are separated from each other by distillation of one of said extractants.

Claim 4 (Currently Amended): ~~Method~~ The method according to claim 1, in which the first and second extractants are separated from each other by cryogenic solidification of one of said extractants.

Claim 5 (Currently Amended): ~~Method~~ The method according to claim 1, in which the first and second extractants are separated from each other by demixing the organic phase into a first organic sub-phase which contains the first extractant, and a second organic sub-phase which is non-miscible with the first organic sub-phase and which contains the second extractant ~~two non-miscible organic phases~~.

Claim 6 (Currently Amended): ~~Method~~ The method according to claim 1, in which the first and second extractants are separated from each other by an operation consisting in removing ~~leading to the removal of~~ the second extractant from the organic phase ~~and~~ while maintaining the first extractant in said phase.

Claim 7 (Currently Amended): ~~Method~~ The method according to claim 6, in which the first and second extractants are separated from each other by aqueous solubilisation, distillation or cryogenic solidification of the second extractant.

Claim 8 (Currently Amended): ~~Method~~ The method according to claim 6 ~~or claim 7~~, in which the organic phase is subjected, after removing the second extractant, to a purification treatment.

Claim 9 (Currently Amended): ~~Method~~ The method according to claim 8, in which the second extractant is back-extracted in a fraction of the organic phase purified by bringing said fraction into contact with an aqueous solution of said extractant.

Claim 10 (Currently Amended): ~~Method~~ The method according to claim 1 ~~any of the previous claims~~, in which the first and second extractants are chosen from the group comprising solvating extractants, anion exchange extractants and cation exchange extractants.

Claim 11 (Currently Amended): ~~Method~~ The method according to claim 1 ~~any of claims 1 to 10~~, in which the first or second extractant is chosen from the group comprising tri-n-butylphosphate, malonamides, trialkylphosphine oxides, carbamoylphosphine oxides, tri-isobutylphosphine sulphides, carbamoylphosphonates, substituted pyridines and 2,2'-dibenzimidazoles.

Claim 12 (Currently Amended): ~~Method~~ The method according to claim 1 ~~any of claims 1 to 10~~, in which the first or second extractant is chosen from the group comprising quaternary ammoniums, secondary amines, tertiary amines and trialkyl guanidines.

Claim 13 (Currently Amended): ~~Method~~ The method according to claim 1 ~~any of claims 1 to 10~~, in which the first or second extractant is chosen from the group comprising carboxylic acids, phosphoric acids, phosphonic acids, phosphinic acids, thiophosphoric acids, thiophosphonic acids, thiophosphinic acids, thiophosporous acids, sulphonic acids, hydroxamic acids, substituted 8-hydroxyquinolines, R-diketones and R-5 hydroxyoximes.

Claim 14 (Currently Amended): ~~Method~~ The method according to claim 1 ~~any of the previous claims~~, in which the element(s) E1 are chosen from the group comprising the minor actinides, whereas the element(s) E2 are chosen from the group comprising the lanthanides.

Claim 15 (Currently Amended): ~~Method~~ The method according to claim 14, in which the elements E1 and E2 are co-extracted from an aqueous solution having a pH at the most equal to 1 and the first extractant is a solvating extractant.

Claim 16 (Currently Amended): ~~Method~~ The method according to claim 15, in which the solvating extractant is a malonamide, in particular dimethyldibutyltetradecyl malonamide (DMDBTDMA) or dimethyldioctylhexylethoxymalonamide (DMDOHEMA).

Claim 17 (Currently Amended): ~~Method~~ The method according to claim 15 or claim 16, in which the second extractant is a cation exchange extractant.

Claim 18 (Currently Amended): ~~Method~~ The method according to claim 17, in which the cation exchange extractant is a phosphoric acid, in particular bis-(2-ethylhexyl)phosphoric acid (HDEHP) or bis-(1,3-dimethylbutyl)phosphoric acid (HBDMBP).

Claim 19 (Currently Amended): ~~Method~~ The method according to claim 14 ~~any of claims 14 to 18~~, in which the element(s) E1 are stripped from the organic phase by bringing said organic phase into contact with an aqueous acid solution, of pH higher than 1, and containing one or several complexing agents chosen from among the group comprising carboxylic acids, hydroxy-carboxylic acids, polyaminocarboxylic acids, dithiophosphonic acids, sulphonic acids, amines and hydrophilic polyazines.

Claim 20 (Currently Amended): ~~Method~~ The method according to claim 14 ~~any of claims 14 to 19~~, in which the element(s) E2 are stripped from the organic phase by bringing said organic phase into contact with an aqueous solution of nitric acid of molarity between 0.1 and 1.

Claim 21 (Currently Amended): ~~Method~~ The method according to claim 14 ~~any of claims 14 to 20~~, in which step e) of each cycle comprises the following operations:

- selectively stripping the second extractant from the organic phase;

- purifying the organic phase thus unloaded of the second extractant; and

- back-extracting the second extractant in a fraction of the organic phase thus purified, said fraction representing around 5 to 25% by volume of the volume of the organic phase at the end of step d).

Claim 22 (Currently Amended): ~~Method~~ The method according to claim 21, in which the second extractant is stripped from the organic phase by bringing said organic phase into contact with an aqueous solution, of pH higher than 3, containing a strong base and, if necessary, a weak hydrophilic acid.

Claim 23 (Currently Amended): ~~Method~~ The method according to claim 21, in which the organic phase is purified by bringing it into contact with an aqueous solution of a strong base, of pH higher 10 than 8.

Claim 24 (Currently Amended): ~~Method~~ The method according to claim 21, in which the second extractant is back-extracted in the fraction of organic phase by bringing said fraction into contact with an aqueous acid solution, of pH less than or equal to 3.

Claim 25 (Currently Amended): ~~Method~~ The method according to claim 14 ~~any of claims 14 to 24~~, in which one separates americium and curium from lanthanides.